

# METHOD OF DEFECTS RECOVERY AND STATUS DISPLAY OF DRAM

## ABSTRACT

A method of defects recovery and status display of dynamic random access memory( DRAM), which mainly start time test through a monitor program, and predetermine a spare memory page which serves as temporary storage of internal data while the memory page is tested, the internal data of the memory page which will be tested are duplicated to the predetermined memory page, and then a table of look-aside buffer(TLB) is built to map the location of the tested memory page to the predetermined spare memory page, the tested memory page is re-directed to the predetermined spare memory page through TLB, which makes normal access be re-directed to the spare memory page; while any memory page with defects is detected, the monitor program will continuously block the said tested memory page, and any access operation for the said memory page will re-direct to the predetermined spare memory page according to TLB, and LCD will be driven to display the message such as testing frequency, intact report, detected fault, sum of memory usage, and actual memory size, etc., which make DRAM maintain in normal access and with high-level data integrity though there is error existed.